ENERGY STAR® Product Development UpdateWinter 2005

Provided below are updates on existing and potential ENERGY STAR qualified product categories currently being researched by the Environmental Protection Agency (EPA) and the Department of Energy (DOE). For more information on the status of EPA and DOE's research, visit the ENERGY STAR Specifications in Development Web site at www.energystar.gov/productdevelopment. Click on "Revisions to Existing Specifications" or "New Product Specifications in Development" on the right navigation bar for a list of product-specific Web pages. Contacts are also provided at the end of each update for those parties interested in finding out more about a particular product.

Battery Charging Systems

In December 2005, EPA plans to issue its final draft of the ENERGY STAR Battery Charging Systems specification, which will cover products that are currently excluded from the ENERGY STAR External Single Voltage External Ac-Dc and Ac-Ac Power Supply specification, such as small household appliances and power tools. The specification is scheduled to take effect in **January 2006**. For more information, visit the ENERGY STAR Battery Charging Systems Specification Development Web page.

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Ceiling Fans

EPA hopes to release a final addendum to the existing ENERGY STAR Ceiling Fan (Version 2.0) specification by the end of the year that includes the specific performance requirements that ceiling fan light kits must meet to earn the ENERGY STAR. Partners will have until October 2006 to comply with some of the more recent requirements, which were determined as a result of revisions to the ENERGY STAR Residential Light Fixture (RLF) specification. The existing ceiling fan specification defers to the RLF specification for all light kits requirements. This addendum will help ceiling fan manufacturers to identify those requirements that apply specifically to light kits without the need to review the entire RLF specification.

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Clothes Washers

On March 28, 2005, DOE released a proposed clothes washer criteria revision for 2007 that includes a minimum Modified Energy Factor (MEF) of 1.72 and a maximum water factor of 8.0. Final comments have been received and DOE is evaluating all stakeholder feedback and will release final criteria by the end of the year. The criteria change will apply to both residential clothes washers and residential style commercial clothes washers. As part of the Energy Policy Act of 2005, the revised ENERGY STAR criteria will be announced by December 31, 2005. To keep the same implementation schedule as the Federal standard, the new ENERGY STAR criteria for clothes washers will go into effect on January 1, 2007.

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Compact Fluorescent Light Bulbs (CFLs)

DOE distributed the first draft revision of the ENERGY STAR criteria for CFLs (Version 4.0) to industry stakeholders in September for review and comment and hosted a criteria revision meeting on September 20, 2005. The first comment period ended on October 14, 2005 and all criteria revision meeting materials and submitted comments are posted on the ENERGY STAR Compact Fluorescent Light Bulbs Specification Revision Web page. DOE is working with industry and Pacific Northwest National Laboratory (PNNL) to revise the CFL reflector elevated temperature test procedure as well as refining the efficacy and run-up time requirements. The second draft of the criteria is scheduled for distribution to stakeholders for review and comment before **December 31, 2005.** The current suggested effective date for this criteria revision is **January 1, 2007.**

Computers

On August 17, 2005, EPA shared its latest thinking regarding a revised ENERGY STAR Computer (Version 4.0) specification by releasing the following four draft framework documents: desktops, notebooks, desktop-derived servers, and workstations. On September 22, 2005, EPA distributed a Draft Idle Test Procedure for stakeholder review and comment. Based on comments received, and additional discussions with manufacturers and other industry stakeholders, EPA is preparing a Draft 1 specification and hopes to release the document before the end of the year. EPA is planning to attend the Consumer Electronics Show[®] (CES) in January 2006 to discuss the latest specification with various industry members attending the show. It is EPA's hope to finalize Tier I requirements, and begin working toward a subsequent tiered computer benchmarking metric, over the next few months. For more information about the specification revisions visit the Computer Revisions Web page.

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Dehumidifiers

The ENERGY STAR Dehumidifier (Version 2.0) specification was finalized and distributed to stakeholders on August 26, 2005. Tier 1 of the new specification takes effect on October 1, 2006, followed by a more stringent Tier 2 specification for the > 54 to ≤ 75 pints/day category. Tier 2 is scheduled to take effect on June 1, 2008. Unlike the Version 1.0 specification, Version 2.0 refers to dehumidifier capacity in pints/day as opposed to Liters/day. Energy Factors continue to be measured in L/kWh, which is the industry standard for this performance metric.

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Dishwashers: Commercial

EPA is continuing to conduct research on the energy and water use of commercial dishwashers. Based on this continued research, and further discussions with industry members, EPA will decide whether or not to move forward with a draft specification. If a decision is made to move forward, EPA will inform industry stakeholders of the decision and shortly thereafter, release a draft specification that would present the minimum performance, testing, and labeling requirements that models would need to meet to earn the ENERGY STAR.

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Dishwashers: Residential

On June 17, 2005, DOE released a preliminary analysis of the current dishwasher market and issues that affect the criteria. On July 13, 2005, DOE hosted a stakeholder meeting in Washington, DC to discuss new criteria levels for energy consumption, the possible inclusion of standby power and water use, and the potential timing of any criteria change. Preliminary comments have been received and draft criteria will be released in early December. As part of the Energy Policy Act of 2005, new ENERGY STAR criteria will be announced by December 31, 2005. **The new criterion is scheduled to go into effect on January 1, 2007.**

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Enterprise Servers

EPA is co-hosting a *Conference on Enterprise Servers and Data Centers: Opportunities for Energy Savings* at the Sun Microsystems Conference Facility on January 31, 2006 in Santa Clara, CA. Other sponsors include: Sun, AMD, Lawrence Berkeley National Laboratory, Power Supply Manufacturers Association (PSMA), and Pacific Gas & Electric (PG&E) and more are signing onto the conference. In addition, the ENERGY STAR Buildings Team is hosting a second day meeting to discuss the impacts of data center design and efficiencies on whole building performance. More information regarding this conference can be found at: www.energystar.gov\serverconference.

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Furnaces

On October 21, 2005, EPA announced its intention to revisit the requirements of the existing ENERGY STAR Furnace specification. EPA is especially interested in determining whether there is a more appropriate AFUE level for oil furnaces, given the differences between engineering with oil versus gas technologies. In addition, EPA is investigating the potential inclusion of a metric for measuring the electricity used by the furnace fan. Once EPA has completed its preliminary research a decision will be made as to whether the specification needs to be revised. If a decision is made to revise the specification, EPA will follow the standard ENERGY STAR specification revision process, working closely with all interested stakeholders.

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Central Air Conditioners and Air Source Heat Pumps

On September 15, 2005, EPA announced the finalization of the ENERGY STAR Air Source Heat Pumps (ASHPs) and Central Air Conditioners (CACs) Version 4.0 specification, which will go into effect on April 1, 2006. All documents related to the specification revision process can be found on the ASHP/CAC specification revision Web page.

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Ice Machines

EPA is currently conducting preliminary research on the ice machine market, existing technologies and ranges of efficiency performance, and the savings potential of high efficiency water- and air-cooled models. As of January 1, 2010, all ice machines will be required by the Energy Policy Act of 2005 to meet current Consortium of Energy Efficiency (CEE) Tier I levels. Based on this preliminary research EPA will determine whether or not to introduce an ENERGY STAR specification for ice machines that can represent the top performing models prior to this effective date.

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Imaging Equipment

On December 21, 2005, EPA plans to issue its second draft of the ENERGY STAR imaging equipment specification, which will provide power and energy requirements for products addressed by both the Operational Mode (OM) approach and the Typical Electricity Consumption (TEC) approach. **Stakeholder comments will be accepted on this draft until January 20, 2006 for EPA consideration.** An ENERGY STAR Imaging Equipment meeting is scheduled for the week of February 6, 2006 to discuss the feedback received on this draft in preparation for the final specification. EPA is scheduled to distribute the final specification to stakeholders on March 1, 2006. For more information, visit the Imaging Equipment Web page.

Pre-Rinse Spray Valves

On September 21, 2005, EPA distributed a letter to all stakeholders explaining that it would no longer pursue an ENERGY STAR specification for pre-rinse spray valves due to their inclusion in the Energy Policy Act of 2005. Among other things, the Act sets a Federal minimum efficiency standard for pre-rinse spray valves at 1.6 gallons per minute, which is the level that EPA was proposing for ENERGY STAR. EPA will continue to monitor the market for this product and may reevaluate its decision in the future if the market changes.

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Programmable Thermostats

In an effort to improve the potential for greater energy savings, EPA has been working with industry stakeholders to design a new specification that would make ENERGY STAR programmable thermostats unique and easy to use. On **January 11, 2005** EPA will be holding an industry meeting to propose a change in direction for the specification process and to discuss a new set of goals for the revision process. EPA would like to request the attendance of programmable thermostat manufacturers to discuss these issues and provide feedback on the new direction. More information on this meeting can be found on the ENERGY STAR Programmable Thermostats Specification Revision Web page.

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Residential Windows, Doors, and Skylights

On May 17, 2005, DOE announced the establishment of an Equivalent Energy Performance Amendment to the ENERGY STAR eligibility criteria for residential windows and doors. The amendment allows products with energy performance equivalent to the current prescriptive criteria to qualify in the Southern and South/Central climate zones, excluding California. On September 19, 2005, the amendment went into effect and manufacturers and retailers may now label and promote products qualifying under the amendment. For more information on the amendment and its implementation refer to the official letter from DOE. To reflect the criteria amendment and clarify all current program rules and guidelines for manufacturers participating in ENERGY STAR for Windows, Doors, and Skylights, DOE has updated the Program Requirements for Residential Windows, Doors, and Skylights. This revised document can be found on the ENERGY STAR Partner Resources Web page at www.energystar.gov/partners.

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Roof Products

EPA is working on a Draft 1 ENERGY STAR Roof Products (Version 2.0) specification that will include a new emissivity requirement, clarification regarding appropriate test procedures and the cleaning of products prior to testing, and the addition of new product types and relevant definitions. EPA hopes to release this Draft 1 specification for stakeholder review and comment by the end of the year.

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Room Air Conditioners

On November 18, 2005, DOE expanded the ENERGY STAR criteria for room air conditioners to include room air conditioners with a heat pump or reverse cycle. Qualified models must be at least 10 percent more efficient than the existing Federal standard for the four categories that cover units with a heat pump or reverse cycle.

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Set-top Boxes

EPA is currently conducting research to determine if an ENERGY STAR specification is appropriate for Digital TV Adapters (DTAs), or whether it would be more beneficial to develop energy-efficiency criteria for DTAs that would serve a range of parties working to further energy-efficiency for these types of boxes.

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Telephony

EPA is close to finalizing the ENERGY STAR Telephony (Version 2.0) specification. **This specification will have an effective date of July 1, 2006**. As of this date, telephony manufacturers will have to: (i) ensure that their products meet the system-level requirements in the Version 2.0 specification; and (ii) use external power supplies that meet or exceed Tier 1 of the ENERGY STAR Single Voltage External Ac-Dc and Ac-Ac Power Supplies specification, if their telephony products are designed for use with external power supplies.

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Televisions

EPA distributed a memo and accompanying Question and Answer document to stakeholders on September 21, 2005, officially announcing the beginning of the revision process for the current ENERGY STAR TV/VCR specification. As a first step in this process, EPA is working with its international country partners to develop a new test procedure to measure the amount of energy being consumed by a television when it is 'active' or in 'on' mode. Once this test procedure is finalized, EPA intends to work with industry to gather and analyze data to determine energy consumption levels, a suitable performance metric for televisions, possible ENERGY STAR specification frameworks, and other criteria.

EPA is concurrently working on the development of a brief market research summary report on the current state of the television market, focused on the trends affecting sales and power consumption of products that have led to EPA's decision to revise this specification. ENERGY STAR representatives will be attending Consumer Electronics Show in January 2006 to conduct additional research for the report and meet with interested stakeholders. Shortly after the show, a Draft of the report will be released for stakeholder review and comment.

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Vending Machines

In October 2005, EPA met with members of the National Automatic Merchandisers Association (NAMA) Energy Group to discuss the remanufactured vending machines requirements proposed in the Draft 1 remanufactured vending machine program strawman document. Based on the ideas and concerns presented during this meeting, and subsequent stakeholder discussions, EPA will be releasing a Draft 2 "rebuilt" vending machine specification for review and comment. The Draft 2 document will present the performance, testing, and reporting requirements that ENERGY STAR partners and "rebuilt" machines will have to meet to earn the ENERGY STAR. EPA hopes to release this latest version for stakeholder review and comment before the end of the year.

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